



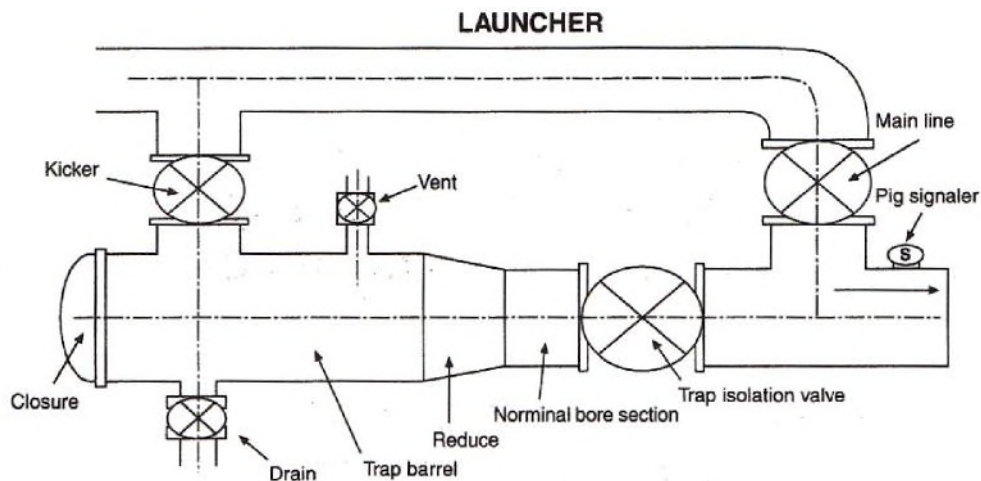
Pig Launching & Receiving Procedures

Pig launchers are used to launch the pig into the pipeline, and **pig receivers** are used to receive the pigs after they have made a successful run. The choice of these pig traps will depend on the type of pig to be run and pipeline design conditions. Provisions in the station design should include handling equipment for pigs 20" and larger. Caution should be taken for liquid spillage from the pig traps.

Typical Pig Launching Procedures

The operational sequence described below is for general information only. Operating procedures will vary from one pipeline company to next. The following pig launching procedures can be used as a guideline for developing operating procedures only in conjunction with company specified safety protocols.

Since company policies vary regarding whether the pig launcher is left on stream or isolated from the pipeline after the pig is launched, the operator should verify that the trap is isolated from the pipeline and depressurized before commencing any part of the launch procedure.



1. Make sure that the isolation valve and the kicker valve are closed.
2. In liquid systems, open the drain valve and allow air to displace the liquid by opening the vent valve. In natural gas systems, open the vent and vent the launcher to atmospheric pressure.
3. When the pig launcher is completely drained (0 psi), with the vent and drain valves still open, open the trap (closure) door.
4. Install the pig with the nose firmly in contact with the reducer between the barrel and the nominal bore section of the launcher.
5. Clean the closure seal and other sealing surfaces, lubricate if necessary, and close and secure the closure door.

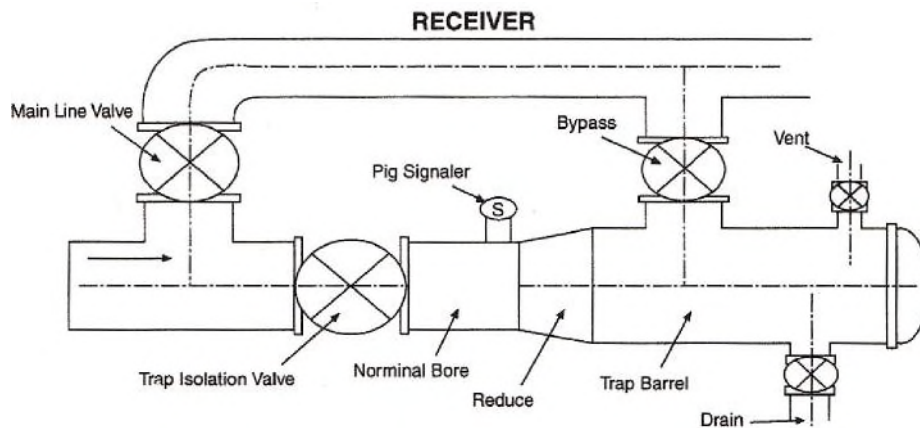


6. Close the drain valve. Slowly fill the trap by gradually opening the kicker valve and venting through the vent valve.
7. When filling is complete, close the vent valve to allow pressure to equalize across the isolation valve.
8. Open the isolation valve. The pig is ready for launching.
9. Partially close the main line valve. This will increase the flow through the kicker valve and behind the pig. Continue to close the main line valve until the pig leaves the trap into the main line as indicated by the pig signaler.
10. After the pig leaves the trap and enters the main line, fully open the main line valve. Close the isolation valve and the kicker valve.
11. The pig launching is complete.

Typical Pig Receiving Procedures

The operational sequence described below is for general information only. Operating procedures will vary from one pipeline company to next. The following pig receiving procedures can be used as a guideline for developing operating procedures only in conjunction with company specified safety protocols.

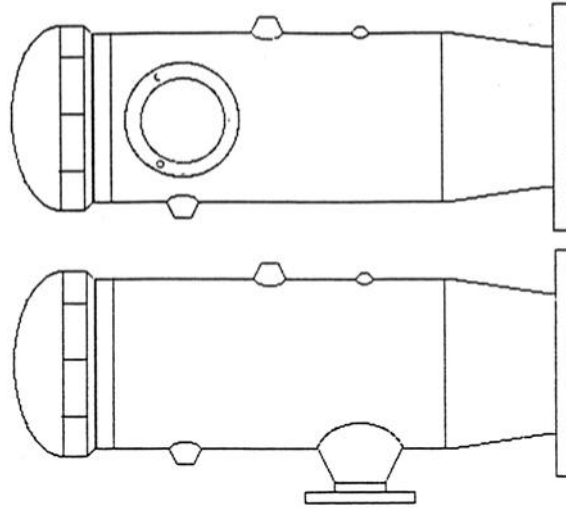
Since company policies vary regarding whether the pig receiver is left on stream or isolated from the pipeline, the operator should verify whether there is any internal pressure in the receiving trap before starting any part of the receiving procedures.



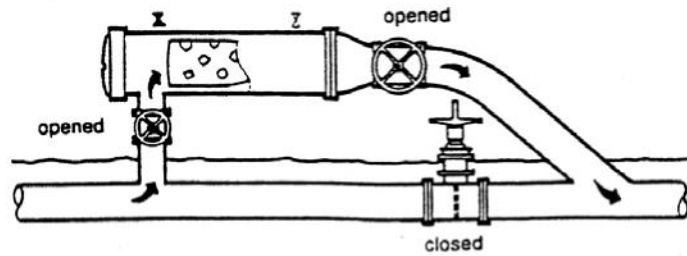
1. Make sure the receiver is pressurized.
2. Fully open the bypass valve.
3. Fully open the isolation valve and partially close the main line valve.
4. Monitor the pig signaler for pig arrival.
5. Close the isolation valve and bypass valve.
6. Open the drain valve and the vent valve.
7. Check the pressure gauge on the receiver to assure the trap is depressurized (0 psi).
8. Open the trap closure and remove the pig from the receiver.
9. Clean the closure seal and other sealing surfaces, lubricate if necessary, and close and secure the trap (closure) door.
10. Return the receiver to the original condition.



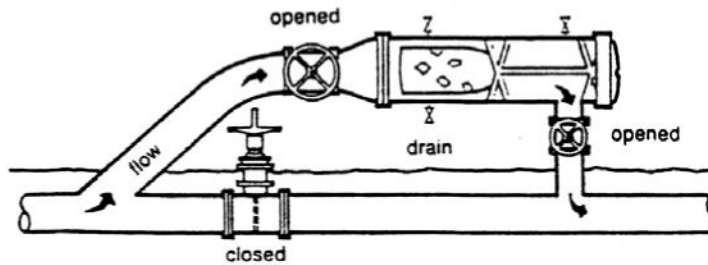
Standard Pig Launcher / Receiver



- All launchers are primed.
- All launchers are hydrostatically tested.
- Valves on launchers & receivers must be round.
- Full port with a 100% pipe size opening.



CONVENTIONAL LAUNCHING METHOD



CONVENTIONAL RECEIVING METHOD